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EXAMINER	
STERRETT, JONATHAN G	

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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No.	Applicant(s)	
	09/851,732	DUBOIS ET AL.	
	Examiner	Art Unit	
	JONATHAN G. STERRETT	3623	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE *3* MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *10 July 2008*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-20* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-20* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

Summary

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 10 July 2008 has been entered.

This **Non-Final Office Action** is responsive to applicant's amendment filed 10 July 2008. Currently **Claims 1-20** are pending.

Response to Arguments

2. The examiner withdraws the 112 2nd rejection of Claim 6. The applicant's remaining arguments have been fully considered but are not persuasive

3. The applicants argue that the response to the traversal of the Official Notice is inadequate because the provided reference suggests that, since it is a beta version, that providing html documents using a client/server/browser approach is not old and well known.

The examiner disagrees.

The fact that the provided reference suggests it is a beta version has nothing to do with whether providing an html document is old and well known. The fact that it is a beta version provides evidence that at least before the date of the instant application, the subject regarding the Official Notice was known in the art.

4. The applicants provide affidavit evidence swearing behind the Cognos reference. The examiner acknowledges the affidavits and provides a new rejection below based on a 1998 study provided by Merrill Lynch that details what is known in the art regarding Enterprise Information Portals.

Claim Rejections - 35 USC § 103

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

6. **Claims 1-8, 11, 12 and 14-20** are rejected under 35 U.S.C. 103(a) as being unpatentable over "Enterprise Information Portals – Move over Yahoo!; the Enterprise Information Portal is on its Way," Christopher C Shilakes, Julie Tyman. Merrill Lynch Industry Report - . 16 November 1998, 64 pgs, retrieved from the web at ikt.hia.no/perep/eip_ind.pdf,(hereinafter **Merrill**) in view of Cawse U.S. Patent 6,725,183 (hereinafter **Cawse)**.

Regarding **Claim 1**, Merrill teaches:

A method of presenting an analysis of enterprise wide business data, comprising the steps of:

Page 3 column 1 para 3-4.

a) in response to a user request <u>over a network</u> operable to access said enterprise wide business data and to provide analysis of said enterprise wide business data,

page 3 column 2 para 4, page 4 para 1-3

transferring an electronic application to said user, wherein said electronic application allows said user to select a performance measure to be analyzed for a data set in said enterprise wide business data;

page 10 para 5

b) in response to a request from said user, performing an analysis of said performance measure; and

page 10 para 5, page 12 para 2-5

c) transferring an electronic copy of said statistical analysis to said user.

Page 20 para 4-6.

Merrill thus addresses providing a client server system (including a browser) that allows users to specify enterprise data for analyzing. Merrill provides a method operating on a computer system to allow users to customize and obtain data analysis and reports so that they can obtain "key business insight".

Merrill does not teach providing an electronic document (e.g. an HTML page) provided by a website on the network where users can use to access the data warehousing applications, however Official Notice is taken that using a website that utilizes electronic documents to provide client/server/browser applications such as taught by Merrill is old and well known in the art. Using a website that utilizes electronic

documents (e.g. html pages) provides a convenient and easy to use way to access information over a network.

It would have therefore been obvious to one of ordinary skill in the art at the time of the invention to modify the teachings of Merrill, regarding providing a data warehousing application running over a network (i.e. intranet/extranet/internet), to include the step of accessing the data warehousing application at a website that provides the application using an electronic document, because it would provide a convenient and easy to use way to access the client/server/browser application taught by Merrill.

Merrill does not teach where the analysis is statistical in nature, including a six sigma analysis. However, performing statistical analysis, including a six sigma analysis based on process data that is business-oriented is taught by **Cawse**.

Cawse teaches performing a statistical analysis method using a web-based computer system (see column 9 line 9-12).

Cawse teaches storing process information in a database (Figure 7 #262 and column 6 line 65) so that the process information can be analyzed (see column 9 line 15-19, Design for Six Sigma techniques are data analysis of business performance, because the removal of variation in a process removes defects and ultimately cost from

a system, i.e. thus is 'business' performance). Cawse notes that his approach (i.e. various DFSS techniques provide for analyzing business performance) can be applied using a computer system with storage devices (column 8 line 55-60).

Although Cawse demonstrates the invention in the context of a chemical process, it is noted (column 1 line 50-53, column 2 line 15-17) that the six sigma techniques are applicable to business processes as well.

Cawse and Merrill both address applying data analysis tools to understand information that is contained in stored data so that the business management can be improved, thus both Cawse and Merrill are analogous art.

It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the teachings of Merrill, regarding providing a data warehouse that provides for user-specified analysis of business data, to include the step of where the analysis includes a statistical analysis, because the analysis of statistical variation as taught by Cawse, provides for better control and a subsequent improvement to remove defects and cost.

Regarding **Claims 2, 3 and 4**, Merrill does not teach:

transferring a Hyper-Text Markup Language document comprising said statistical analysis in histogram format, as per **Claim 2**; and **overlaying on said**

histogram an indicator of a statistical mean and an indicator of a user specified target limit, as per **Claim 3**, and **highlighting the area of said histogram outside of said user specified target limit, wherein the relative number of defects are graphically visible**, as per **Claim 4**.

However Official Notice is taken that it is old and well known in the art to provide HTML documents using the client/server/browser architecture taught by Merrill, because HTML is a proven and reliable way to provide electronic documents over the types of networks (intranet/extranet/Internet) taught by Merrill.

It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the teachings of Merrill, regarding providing analysis applications using a client/server/browser architecture, to include the step of providing the application using an HTML document with the client/server/browser architecture, because it would provide a proven and reliable way to transmit information and requests over a network.

Merrill teaches providing statistical calculations (page 20 para 3-6) and teaches providing analysis of business processes over a network.

Cawse teaches providing a statistical analysis, as discussed above, and where:

providing a statistical analysis in histogram format, as per **Claim 2**; and

Figure 14, upper left hand chart "Process capability analysis for 2B/P" provides a histogram representing a process capability metric.

overlaying on said histogram an indicator of a statistical mean and an indicator of a user specified target limit, as **per Claim 3**, and

Figure 14, upper left hand chart "Process capability analysis for 2B/P" provides an indicator of the mean by the superposition of a normal distribution and the vertical bar at the position 0.9 on the x axis. This chart also contains a USL and a LSL (i.e. a user specified target limit, since the user is specifying the upper and lower service limits for the process to be in control.

highlighting the area of said histogram outside of said user specified target limit, wherein the relative number of defects are graphically visible, as per **Claim 4**.

Figure 14, upper left hand chart "Process capability analysis for 2B/P", the bar to the left of the LSL highlights the area of the histogram outside the LSL where the size of this bar provides a graphical indicator of the relative number of process observations that are below the LSL (i.e. defects since they are outside the LSL-USL range).

Cawse teaches performing this method using a web-based computer system (see column 9 line 9-12). Cawse notes that his invention can be administered over an internet (i.e. using a server) so that technical personnel working remotely can access the process information to apply six sigma techniques to the process (column 9 line 9-10).

Cawse teaches storing process information in a database (Figure 7 #262 and column 6 line 65) so that the process information can be analyzed (see column 9 line 15-19, Design for Six Sigma techniques are data analysis of business performance, because the removal of variation in a process removes defects and ultimately cost from a system, i.e. thus is 'business' performance). Cawse notes that his approach can be applied using a computer system with storage devices (column 8 line 55-60).

Although Cawse demonstrates the invention in the context of a chemical process, it is noted (column 1 line 50-53, column 2 line 15-17) that the six sigma techniques are applicable to business processes as well.

Cawse and Merrill both address applying data analysis tools to understand information that is contained in stored data so that the business management can be improved, thus both Cawse and Merrill are analogous art.

It would have been obvious to one of ordinary skill in the art at the time of the invention to further modify the teachings of Merrill and Cawse, regarding providing a statistical analysis application using a client/server/browser architecture that utilizes HTML documents to provide an analytical application, to include the steps of **providing said statistical analysis in histogram format**, as per **Claim 2**; and **overlaying on said histogram an indicator of a statistical mean and an indicator of a user**

specified target limit, as **per Claim 3**, and **highlighting the area of said histogram outside of said user specified target limit, wherein the relative number of defects are graphically visible**, as per **Claim 4**, because Cawse teaches that applying this approach using the annotated histogram provides for a way to analyze and remove variability from a business process, thus reducing defects and improving customer satisfaction.

There is a reasonable expectation of success to combining the teachings of Cawse into Merrill because using an annotated histogram of process variation highlights areas where a business process metric is not in statistical control. The highlighting of out-of-control processes promotes management's awareness to fix the problems causing the out of control process which then reduces the variation as determined by process metrics – variation means defects and defects mean unhappy customers (see column 1 line 54-67).

Regarding **Claim 5**, Merrill teaches receiving and responding to electronic requests to provide analyses to said user, but does not teach:

d) in response to an electronic request from said user, running a simulation to determine the effect varying a user specified statistical parameter of a plurality of statistical parameters has on another statistical parameter; and

e) electronically transferring the results of said simulation to said user, wherein the user is presented a graphical display providing information to assist in quality improvement.

Cawse teaches:

d) in response to an electronic request from said user, running a simulation to determine the effect varying a user specified statistical parameter of a plurality of statistical parameters has on another statistical parameter; and

column 8 line 10-15, a DOE (design of experiments) is a simulation that is run on a computer to determine the effect of varying inputs (i.e. the various x's) that have on other statistical parameters (i.e. the variability of the process). This is also shown in Figure 14 which shows the effects of varying the statistical parameters of the upper right hand chart has on the lower left hand chart through a DOE.

e) electronically transferring the results of said simulation to said user, wherein the user is presented a graphical display providing information to assist in quality improvement.

Column 8 line 20-25 & Figure 16 shows a contour plot that is the results of the DOE (simulation) that shows a graphical display providing information to assist in quality improvement to reduce variability.

Cawse teaches storing process information in a database (Figure 7 #262 and column 6 line 65) so that the process information can be analyzed (see column 9 line

15-19, Design for Six Sigma techniques are data analysis of business performance, because the removal of variation in a process removes defects and ultimately cost from a system, i.e. thus is 'business' performance). Cawse notes that his approach can be applied using a computer system with storage devices (column 8 line 55-60).

Although Cawse demonstrates the invention in the context of a chemical process, it is noted (column 1 line 50-53, column 2 line 15-17) that the six sigma techniques are applicable to business processes as well.

Cawse and Merrill both address applying data analysis tools to understand information that is contained in stored data so that the business management can be improved, thus both Cawse and Merrill are analogous art.

It would have been obvious to one of ordinary skill in the art at the time of the invention to further modify the teachings of Merrill and Cawse, regarding providing a statistical analysis application using a client/server/browser architecture that utilizes HTML documents to provide an analytical application, to include the steps of running a simulation to determine the effects of changing statistical parameters that represent process capability, because Cawse teaches that applying a DOE approach provides for a way to analyze and remove variability from a business process, thus reducing defects and improving customer satisfaction.

Regarding **Claim 6**, Merrill teaches receiving and responding to electronic requests to provide analyses to said user, but does not teach:

wherein said plurality of statistical parameters comprise statistical mean, standard deviation, a user specified target, actual percentage of data above and below said user specified target, and sigma value.

Cawse teaches

wherein said plurality of statistical parameters comprise statistical mean, standard deviation, a user specified target, actual percentage of data above and below said user specified target, and sigma value

Figure 14 shows a before and after histogram (upper left hand corner and lower right hand corner). This chart shows a plurality of parameters that include a statistical mean (0.914), standard deviation (.086), USL & LSL (user-specified targets for what the process capability should be), CPK (a sigma value indicating process capability), PPM<USL and PPM>LSL are actual percentages of data above and below the user-specified target.

Cawse teaches storing process information in a database (Figure 7 #262 and column 6 line 65) so that the process information can be analyzed (see column 9 line 15-19, Design for Six Sigma techniques are data analysis of business performance, because the removal of variation in a process removes defects and ultimately cost from a system, i.e. thus is 'business' performance). Cawse notes that his approach can be applied using a computer system with storage devices (column 8 line 55-60).

Although Cawse demonstrates the invention in the context of a chemical process, it is noted (column 1 line 50-53, column 2 line 15-17) that the six sigma techniques are applicable to business processes as well.

Cawse and Merrill both address applying data analysis tools to understand information that is contained in stored data so that the business management can be improved, thus both Cawse and Merrill are analogous art.

It would have been obvious to one of ordinary skill in the art at the time of the invention to further modify the teachings of Merrill and Cawse, regarding providing a statistical analysis application using a client/server/browser architecture that utilizes HTML documents to provide an analytical application, to include the steps of measuring the effect of running a simulation to determine how changes to a process mean and user specified targets would be affected, because Cawse teaches that these measures are a way to determine process variability so that measuring the effect a simulation has on changing the process mean and target limits from one process state to another provides for a way to analyze and remove variability from a business process, thus reducing defects and improving customer satisfaction.

Regarding **Claim 7,** Merrill teaches:

d) in response to a user request, determining a trend of a parameter over time; and

page 12 para 3.

e) electronically transferring a display of said trend.

Page 12 para 3; page 25 para 3-4.

Merrill teaches that users want to see how data changes over time, since it provides for a key ability to manage the business by understanding causation

Merrill notes that the data warehouse can be run over an internet/extranet/Internet as discussed above with a client/server/browser approach, however, Merrill does not teach where the **statistical parameters** are trended and does not teach conveying information using **a Hyper-Text Markup Language document,** however Official Notice is taken that using a website that utilizes electronic documents (i.e. html pages) to provide client/server/browser applications such as taught by Merrill is old and well known in the art. Using a website that utilizes electronic documents (e.g. html pages) provides a convenient and easy to use way to access information over a network.

It would have therefore been obvious to one of ordinary skill in the art at the time of the invention to modify the teachings of Merrill, regarding providing a data warehousing application running over a network (i.e. intranet/extranet/internet), to

include the step of accessing the data warehousing application at a website that provides the application using an electronic document, because it would provide a convenient and easy to use way to access the client/server/browser application taught by Merrill.

Merrill does not teach where the trend of a parameter is statistical in nature. However, performing statistical analysis based on process data that is business oriented is taught by **Cawse**.

Cawse teachings performing a statistical analysis method using a web-based computer system (see column 9 line 9-12).

Cawse teaches that tracking a trend of a process, as measured by a process capability was necessary to ensure the best possible output (Note Figure 13 "day to day drift", i.e. measuring a trend revealed a loss in statistical capability (column 7 line 50-55).

It would have been obvious to one of ordinary skill in the art to modify the teachings of Merrill, regarding providing for the capability of users to track and display a trend, to include the step of tracking and displaying a statistical parameter trend, as taught by Cawse, because it would help in process improvement through identifying trends that indicate an out of control process.

Regarding **Claim 8**, Merrill and Cawse teach the trend displaying a statistical parameter, as discussed above.

Merrill does not teach:

wherein said statistical parameter is a sigma value.

Cawse teaches:

wherein said statistical parameter is a sigma value.

the sigma value is a statistical parameter that is a measure of process capability (column 1 line 50-55). Cawse further teaches that when the sigma value goes up (i.e. higher process capability) the customer satisfaction also goes up since the sigma value is reflective of the number of defects.

It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the teachings of Merrill, regarding providing for trending of parameters that are important to the business, to include the step of trending the sigma value as a statistical parameter, as taught by Cawse, because it would provide a way ensure customer satisfaction by tracking how well the process is producing defect-free products.

Claim 11 addresses limitations addressed by the rejections of **Claims 1-8** above, except for where the database comprises business data – Merrill teaches a database

comprising business data (page 24 para 1). Merrill further teaches where the performance measure is user-selected (page 24 para 1).

Regarding **Claim 12,** Merrill and Cawse teach the limitations above, including providing a simulation electronically to a user. Merrill teaches using a client/server/browser approach in providing information to a user.

Merrill and Cawse do not teach providing information using an HTML document to a user.

However Official Notice is taken that it is old and well known in the art to provide HTML documents using the client/server/browser architecture taught by Merrill, because HTML is a proven and reliable way to provide electronic documents over the types of networks (intranet/extranet/Internet) taught by Merrill.

It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the teachings of Merrill and Cawse, regarding providing simulation display results using a client/server/browser architecture, to include the step of providing the application using an HTML document with the client/server/browser architecture, because it would provide a proven and reliable way to transmit information and requests over a network.

Claim 14 recites limitations already addressed by the rejection of **Claim 4** above; therefore, the same rejection applies.

Regarding **Claim 15**, Merrill and Cawse teaches the limitations above in **Claim 1**, and Merrill teaches providing selectable data fields to the user for the user to select a plurality of dimensions (page 20 para 6). Merrill further teaches where the performance measure is user-selected (page 31).

Regarding **Claim 16**, Merrill teaches:

d) collecting said data from a plurality of databases; and

page 4 para 4-5..

e) formatting said data in a single format, wherein data from multiple formats is converted to a single format and stored on a single database,

page 8 Figure – ETL (extract transform and load)..

and wherein said peripheral computer system does not have direct access to said databases.

Page 15 #4, security and access rights

Regarding **Claim 17**, Merrill and Cawse teaches the limitations above in Claim 1 and Merrill teaches where the analysis is **available to multiple distributed peripheral computer systems.**

Page 10 para 5.

Regarding **Claim 18**, Merrill does not teach:

formatting said statistical analysis in graphical format, wherein the variance of said data set is graphically viewable.

Cawse teaches:

formatting said statistical analysis in graphical format, wherein the variance of said data set is graphically viewable.

As noted above, the histogram shown by Cawse is a format of a statistical analysis that is in graphical format – since the histogram referenced by Cawse is a representation of a statistical PDF function, this makes the variance of the data set graphically viewable (i.e. the variance is shown as a normally distributed 'bell curve').

Cawse notes that his approach (i.e. various DFSS techniques provide for analyzing business performance) can be applied using a computer system with storage devices (column 8 line 55-60).

Although Cawse demonstrates the invention in the context of a chemical process, it is noted (column 1 line 50-53, column 2 line 15-17) that the six sigma techniques are applicable to business processes as well.

Cawse and Merrill both address applying data analysis tools to understand information that is contained in stored data so that the business management can be improved, thus both Cawse and Merrill are analogous art.

It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the teachings of Merrill, regarding providing a data warehouse that provides for user-specified analysis of business data, to include the step of where the analysis includes a statistical analysis, because the analysis of statistical variation as taught by Cawse, provides for better control and a subsequent improvement to remove defects and cost.

Regarding **Claim 19**, Merrill does not teach:

the step of highlighting data points which are outside of a target range, wherein the relative number of defective data are viewable.

Cawse teaches:

the step of highlighting data points which are outside of a target range, wherein the relative number of defective data are viewable.

Figure 14, upper left hand chart – the use of PPM>USL and PPM<LSL provide for highlighting data points (since PPM – parts defective per million) where this highlighting provides a view of the relative number of defects, since PPM provides a relative defect measure. The use of LSL (lower service limit) and USL (upper service limit) provide bounds for a target range.

Cawse notes that his approach (i.e. various DFSS techniques provide for analyzing business performance) can be applied using a computer system with storage devices (column 8 line 55-60).

Although Cawse demonstrates the invention in the context of a chemical process, it is noted (column 1 line 50-53, column 2 line 15-17) that the six sigma techniques are applicable to business processes as well. Cawse application of six sigma tools provide for analyzing variability, both graphically and numerically as shown by the charts of Figure 14, so that variation in processes can be reduced. The use of PPM techniques provides an indication of how many defects per million a process will produce. Cawse notes that the variation and relative number of defects indicated by the upper left hand chart of Figure 14 illustrate a process that has wide variability.(see column 7 line 63-67). This analysis supported a rationale to improve the process, since the variation was shown to be outside the user specified target (i.e. the LSL).

Cawse and Merrill both address applying data analysis tools to understand information that is contained in stored data so that the business management can be improved, thus both Cawse and Merrill are analogous art.

It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the teachings of Merrill, regarding providing a data warehouse that

provides for user-specified analysis of business data, to include the step of where the analysis includes highlighting the relative number of defective data, because it would lead to process improvements by showing where there is excessive variation in process capability.

Claim 20 recites limitations already addressed by the rejection of **Claim 5** above; therefore, the same rejection applies.

7. **Claims 9, 10 and 13** are rejected under 35 U.S.C. 103(a) as being unpatentable over Merrill in view of Cawse and further in view of U.S. Patent 6,853,920 Hsuing (hereinafter **Hsuing)**.

Regarding **Claim 9**, Merrill teaches adding data to a database for the purpose of using that data for analysis (page 8 Figure).

Cawse teaches the need the track the trend of data (column 7 line 50-55) because it shows that the process is drifting.

Merrill and Cawse do not teach:

d) as new data is gathered, determining if a statistical parameter for said performance measure is outside a user specified target;

and e) automatically notifying said user if said step d) is true, wherein said notification comprises an electronically delivered message to a user specified node.

Hsuing teaches:

d) as new data is gathered, determining if a statistical parameter for said performance measure is outside a user specified target;

column 16 line 5-10, data is gathered from a process as an ongoing approach to provide process control. – this data is compared against what statistical process parameters (see line 55-60) would predict for the process based on what the performance measure (i.e. the incoming data) is.

column 16 line 25-30, the determination is made by comparing new data against the output predicted by the model (i.e. a user specified target, the type of model used to predict is specified by the user and includes, line 20-21, where statistical parameters are being measured) to determine if the process statistical parameter is outside what the model would predict, e.g. line 43-44, the failure of a pump produces process data outside what a model would show the statistical process parameter to be.

and e) automatically notifying said user if said step d) is true, wherein said notification comprises an electronically delivered message to a user specified node.

column 16 line 40-45, a pager or voicemail (i.e. a user-specified node) is notified that a process parameter is out of control. Since pagers and voicemail are electronically operated, a message to these is an electronically delivered message.

Hsuing teaches that his method of process control can apply to data gathered from enterprise resource planning (ERP) systems (column 6 line 20-21). In column 3 line 55-60, Hsuing notes that any process can be monitored (see also column 1 line 43, data from commerce can be monitored and the underlying process controlled)

Hsuing notes that one benefit of using his invention is that since the data is being gathered and analyzed in real time (column 3 line 47-50), it provides immediate control over processes, since the analyzing function (i.e. the determining step regarding something being out of control) occurs in real time on the data.

Merrill, Cawse and Hsuing all address using process data to provide control and monitoring over processes so that process control is improved, thus Merrill, Cawse and Hsuing are all analogous art.

It would have been obvious to one of ordinary skill in the art at the time of the invention to further modify the collective teachings of Merrill and Cawse, regarding providing a network based system to collect and statistically analyze business process data, to include the steps of determining and notifying when a process is out of control

(i.e. a statistical parameter exceeds a user-specified target), because it would enable those responsible for monitoring a process to take quick action since the determining and notifying steps of Hsuing are performed in real time.

Regarding **Claim 10**, Merrill teaches

analyzing said performance measure according to a periodic rate specified by said user.

Page 25 Figure.

Claim 13 recites limitations already addressed by the rejection of **Claim 9** above; therefore, the same rejection applies.

Conclusion

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. .

Application of intelligent agent technology for managerial data analysis and mining, Ranjit Bose, Vijayan Sugumaran. Database for Advances in Information Systems. New York: Winter 1999.Vol.30, Iss. 1; pg. 77, 18 pgs

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jonathan G. Sterrett whose telephone number is 571-272-6881. The examiner can normally be reached on 8-6.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Beth Boswell can be reached on 571-272-6737. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

JGS 9-1-08

/Jonathan G. Sterrett/

Primary Examiner, Art Unit 3623